

NEW SYNONYMY OF THREE AUSTRALIAN ANTS (FORMICIDAE: FORMICINAE: *POLYRHACHIS*)

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Synonymy of three Australian *Polyrhachis* species is proposed (senior names cited first): *P. ammonoeides* Roger = *P. chalchas* Forel; *P. delicata* Crawley = *P. lysistrata* Santschi and *P. hookeri* Lowne = *P. cataulacoidea* Stitz. A lectotype is designated for *P. ammonoeides*.
□Formicidae, *Polyrhachis*, synonymy.

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The species synonymies listed below were recognised during two visits to European and British museums to examine *Polyrhachis* types.

Institutional abbreviations (with the names of co-operating curators) are: BMNH - Natural History Museum, London (Dr B. Bolton); MHNG - Muséum d'Histoire Naturelle, Geneva (Dr C. Besuchet); MNHN - Muséum National d'Histoire Naturelle, Paris (Dr J. Casevitz Weulersse); MNHU - Museum für Naturkunde, Humboldt- Universität, Berlin (Dr F. Koch); NHMB - Naturhistorisches Museum, Basel (Dr M. Brancucci); NHMW - Naturhistorisches Museum, Vienna (Dr M. Fischer); QMBA - Queensland Museum, Brisbane (Mr E.C. Dahms, Dr G.B. Monteith).

Distribution records are given as 'short' coordinates using 1° grid cell system of Taylor (1987).

'*Polych. amonoides* (sic) det. G. Mayr', and (2) 'M.P.' (? Museum Paris). The specimen labelled '*Type' is here selected as lectotype. Other Roger types (e.g. *Polyrhachis latifrons*, *Hemioptica scissa*) suggest that he used asterisks to mark holotype-equivalent specimens. The specimen labels imply that Sydney (=Port Jackson) is the type locality, but the known distribution of *P. ammonoeides* does not support this conclusion.

REMARKS

P. ammonoeides is a ground-nesting ant inhabiting open forests and woodlands; it occurs in Western Australia and adjacent islands: Barrow I. (20/115), Dampier (20/116), Yardie Ck, (22/113), Minderoo (22/115), Kalbarri (27/114), Easter Group Is, Abrolhos I. (28/113), Geraldton (28/114), Dongara (29/114).

SYSTEMATICS

Polyrhachis ammonoeides Roger, 1863

Polyrhachis ammonoeides Roger, 1863:157. Syntype workers. Type locality: 'New Holland'. MNHN (2), NHMW (1).

Polyrhachis chalchas Forel, 1907:307. Syntype workers, female, Original localities; Western Australia, Denham (25/113), Geraldton (28/114), Dongarra (29/114). MHNG (5 syntype workers examined).

LECTOTYPE

Three syntypes of *P. ammonoeides* are similarly pinned and bear identical labels. The MNHN specimens have labels in Roger's handwriting: one with '*Polyrhachis amonoeides* (sic) Roger *Type', the other with '*P. amonoides* (sic)'. The NHMW specimen has two additional labels (1)

Polyrhachis delicata Crawley, 1915

Polyrhachis delicata Crawley, 1915:238. Syntype workers. Type locality: Northern Territory, Darwin (Hill) (12/130). BMNH, QMBA (2 syntypes examined).

Polyrhachis (Myrmotherinx) lysistrata Santschi, 1920:569. Syntype workers. Type locality: Queensland, Townsville (F.P. Dodd) (19/146). NHMB (1 syntype examined).

REMARKS

Syntypes of *delicata*, *lysistrata* and *queenslandica*, together with a substantial number of specimens from Queensland and Northern Territory indicate that *delicata* is not a synonym of *queenslandica* Emery, 1895 as proposed by Crawley (1921) and that *lysistrata* is a synonym of *delicata*. The most obvious difference between *delicata* and *queenslandica* is the direction of

propodeal spines which, in the former, are strongly raised upwards, while in the latter are oblique to the main axis of the body. The body of *queenslandica* is uniformly black, while in *delicata* the head and gaster are mostly dark reddish-brown, with the mesosoma a shade lighter. These characters also distinguish the females of both species. In addition, the median petiolar spine in the female of *queenslandica* is simply pointed, while in female of *delicata* the apex of the spine is emarginate.

Both species are arboreal, using silk to build their nests by joining leaves of various lowland rainforest trees and shrubs. *P. delicata* is known from Northern Territory around Darwin (12/130) and in north Queensland from Mt Finlay (15/145), Cape Tribulation, Kamerunga, Yarrabah (16/145), Mission Beach (17/146) as far south as Townsville (19/146). *P. queenslandica* is apparently confined to the lowland rainforests of north Queensland, ranging from Lockerbie Scrub, Bamaga (10/142) and Iron Range (12/143) on Cape York Peninsula, Cape Tribulation, Kamerunga, Yarrabah (16/145), Bellenden Ker (17/145), Innisfail and Mission Beach (17/146).

Polyrhachis hookeri Lowne, 1865

Polyrhachis hookeri Lowne, 1865:334. Syntype workers. Type locality: Sydney, New South Wales; (33/151). ?BMNH (types presumed lost).

Polyrhachis hookeri var. *aerea* Forel, 1902:521. Syntype workers, females, males. Type locality: Queensland, Mackay (G. Turner) (21/149). MHNG (2 syntype workers, 1 syntype female examined). Kohout & Taylor, 1990.

Polyrhachis cataulacoidea Stitz, 1911:377. Holotype worker. Type locality: Sydney, New South Wales (33/151) (Dämel). MNHU (holotype examined).

REMARKS

Stitz was obviously unaware of *hookeri* when describing *cataulacoidea*. The bright green metallic coloration makes them easy to identify and they are straightforward synonyms.

Distribution of *hookeri* was given by Kohout & Taylor (1990).

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